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WHAT IS CLAIMED IS:

1. A method for improving the function of a valve of a heart, the method comprising the steps of:

placing an elongate member transverse a heart chamber so that a first end of the elongate member extends through a wall of the heart between two papillary muscles, and a second end of the elongate member extends through a septum of the heart;

placing a first anchoring member external the heart; and

placing a second anchoring member inside the heart adjacent the septum, the first and second anchoring members being attached to the first and second ends of the elongate member respectively to fix the elongate member in a position across the heart chamber.

2. The method of claim 1, wherein the heart chamber is the left ventricle and the valve is the mitral valve.

3. The method of claim 2, wherein the first end of the elongate member extends through a wall of the heart approximately midway between the antero lateral papillary muscle and the posterio medial papillary muscle.

4. The method of claim 3, wherein the elongate member is placed proximate the mitral valve.

5. The method of claim 1, wherein the elongate member is fixed in the position so as to change a shape of the heart chamber.

6. The method of claim 1, wherein the elongate member is fixed in the position so as to reposition the papillary muscles.

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7. A method for improving the function of a valve of a heart, the method comprising the steps of:

placing a first elongate member transverse a heart chamber so that each end of the first elongate member extends through a wall of the heart;

placing first and second anchoring members external the chamber, the first and second anchoring members being attached to the ends of the first elongate member to fix the first elongate member in a first position across the chamber;

placing a second elongate member transverse the heart chamber so that each end of the second elongate member extends through a wall of the heart;

placing third and fourth anchoring members external the chamber, the third and fourth anchoring members being attached to the ends of the second elongate member to fix the second elongate member in a second position across the chamber, wherein the first and second positions are substantially coplanar and have differing angles relative to an axis of the chamber.

8. The method of claim 7, wherein the heart chamber is the left ventricle and the valve is the mitral valve.

9. The method of claim 7, wherein the first and second elongate members are fixed in the first and second positions so as to change a shape of the heart chamber.

10. The method of claim 7, wherein the first and second elongate members are fixed in the first and second positions so as to reposition papillary muscles within the chamber.

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11. A method for improving the function of a valve of a heart, the method comprising the steps of:

placing an elongate member transverse a heart chamber so that each end of the elongate member extends through a wall of the heart; and

placing first and second anchoring members external the chamber, the first and second anchoring members being attached to the ends of the elongate member to fix the elongate member in a position across the chamber, wherein the position is superior to the papillary muscles and proximate and substantially across the valve.

12. The method of claim 11, wherein the heart chamber is the left ventricle and the valve is the mitral valve.

13. The method of claim 11, wherein the position of the elongate member alters a shape of an annulus of the valve.

14. The method of claim 11, wherein the position of the elongate member repositions the papillary muscles within the chamber.

15. A splint for improving the function of a valve of a heart, the splint comprising:

an elongate member configured to be positioned transverse a heart chamber so that each end of the elongate member extends through a wall of the heart; and

first and second anchoring members configured to be positioned external the chamber and attached to the ends of the elongate member to fix the elongate member in a position across the chamber, wherein the first anchoring member includes a first portion configured to contact a first region of the heart proximate the valve to change a shape of the valve.

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16. The splint of claim 15, wherein the heart chamber is the left ventricle and the valve is the mitral valve.

17. The splint of claim 16, wherein the first region of the heart is a superior portion of the left ventricle proximate an annulus of the mitral valve.

18. The splint of claim 16, wherein the first region of the heart is a portion of the left atrium proximate an annulus of the mitral valve.

19. The splint of claim 15, wherein the first portion has an oblong shape.

20. The splint of claim 15, wherein the first anchoring member further includes a second portion configured to contact a second region of the heart below the first region.

21. The splint of claim 20, wherein the second portion includes a first structure connected to the elongate member and a second structure connected to the first portion by the first structure.

22. A splint for improving the function of a valve of a heart, the splint comprising:

an elongate member configured to be positioned transverse a heart chamber so that each end of the elongate member extends through a wall of the heart;

first and second anchoring members configured to be positioned external the chamber and attached to the ends of the elongate member to fix the elongate member in a position across the chamber; and

a third anchoring member connected to at least one of the first and second anchoring members by a connection member, the third anchoring member configured to contact a region of the heart proximate the valve to change a shape of the valve.

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23. The splint of claim 22, wherein the third anchoring member connects to the first and second anchoring members by the connection member.

24. The splint of claim 22, wherein the third anchoring member includes a connection mechanism for connecting the third anchoring member to the connection member.

25. The splint of claim 24, wherein the connection mechanism includes a locking screw.

26. The splint of claim 24, wherein the connection mechanism includes a pin.

27. The splint of claim 22, further comprising a connection mechanism for connecting the connection member to the at least one of the first and second anchoring members.

28. The splint of claim 27, wherein the connection mechanism includes a locking screw.

29. The splint of claim 27, wherein the connection mechanism includes a pin.

30. The splint of claim 27, wherein the connection mechanism includes a cap configured to fit over the at least one of the first and second anchoring members.

31. The splint of claim 23, further comprising an adjustment mechanism for adjusting a length of the connection member between the first and second anchoring members.

32. A device for improving the function of a valve of a heart, the device comprising:

a first splint having a first elongate member configured to be positioned transverse a heart chamber so that each end of the elongate member extends through a wall of the heart,

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and a first anchoring member configured to be positioned external the chamber and attached to a first end of the first elongate member;

a second splint having a second elongate member configured to be positioned transverse a heart chamber so that each end of the second elongate member extends through a wall of the heart, and a second anchoring member configured to be positioned external the chamber and attached to a first end of the second elongate member; and

a connecting mechanism configured to be connected to the second ends of each of the first and second elongate members external the chamber and press the wall of the heart chamber to change the shape of an annulus of the valve.

33. The device of claim 32, wherein the connection mechanism is a bar.

34. The device of claim 32, wherein the heart chamber is the left ventricle and the valve is the mitral valve.

35. The device of claim 32, wherein the device is configured so that the connecting bar presses the wall of the heart chamber to change the shape of chamber.

36. A method for improving the function of a valve of a heart, the method comprising the steps of:

placing an elongate member transverse a heart chamber so that each end of the elongate member extends through a wall of the heart; and

placing first and second anchoring members external the chamber, the first and second anchoring members being attached to first and second ends of the elongate member to fix the elongate member in a position across the chamber so as to reposition papillary muscles within the chamber.

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37. The method of claim 36, wherein the first end of the elongate member extends through a wall of the left ventricle between papillary muscles.

38. The method of claim 37, wherein the second end of the elongate member extends through a septum of the heart.

39. The method of claim 36, wherein the chamber is the left ventricle and the valve is the mitral valve.

40. The method of claim 36, wherein the position is superior to the papillary muscles and proximate and substantially across the valve.

41. The method of claim 36, wherein the elongate member is fixed in the position so as to alter the shape of an annulus of the valve.

42. A method for improving cardiac function, comprising:
placing a first member relative to a heart chamber to alter the cross-sectional shape of the chamber; and
placing a second member relative to a valve of the heart chamber to assist in apposition of leaflets of the valve.

43. The method of claim 42, wherein each of the first and second members includes a portion placed transverse the chamber.

44. The method of claim 42, wherein each of the first and second members includes an elongate member.

45. The method of claim 44, wherein the placing each of the first and second elongate members includes securing the elongate members relative to the heart chamber with anchors configured to engage each end of the elongate members and configured to engage an exterior surface of a wall surrounding the heart chamber.

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46. The method of claim 45, wherein the securing the second elongate member includes engaging one of the anchors with an exterior surface of the heart wall proximate the valve to alter a shape of an annulus of the valve.

47. The method of claim 42, wherein the heart chamber is a left ventricle.

48. The method of claim 42, wherein the valve is a mitral valve.

49. The method of claim 42, wherein the placing the second member includes altering the cross-sectional shape of an annulus of the valve.

50. The method of claim 42, wherein the placing the second member includes reducing a radius of an annulus of the valve.

51. The method of claim 42, wherein the placing the second member includes placing the second member so as to alter a position of at least one papillary muscle of the heart chamber.

52. The method of claim 51, wherein the placing the second member includes securing the second member with respect to the heart chamber with an anchor configured to engage an exterior surface of a wall surrounding the heart chamber substantially at a location of the at least one papillary muscle.

53. The method of claim 42, wherein the placing the first member includes placing an elongate member transverse the heart chamber and through a wall surrounding the heart chamber at substantially opposite locations on the heart wall.

54. A method of improving the function of a valve of a heart, the method comprising:

applying a force to an exterior surface of a wall surrounding a chamber of the heart substantially at a location of the valve to alter a shape of the valve.

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55. The method of claim 54, wherein applying the force alters the shape of an annulus of the valve.

56. The method of claim 54, wherein altering the shape of the valve includes appositioning leaflets of the valve.

57. The method of claim 54, wherein altering the shape of the valve includes reducing a radius of an annulus of the valve.

58. The method of claim 54, wherein the force is applied by a device having an elongate member placed transverse the chamber and a first anchor assembly connected at a first end of the member external the chamber and a second anchor assembly connected at a second end of the member external the chamber.

59. A method for improving the function of a valve of a heart, comprising:
placing a device relative to the heart to alter a shape of the valve; and
adjusting the device relative to the heart based on data obtained during the adjusting from real-time monitoring of valve function.

60. The method of claim 59, wherein the device is a splint.

61. The method of claim 59, wherein the device is a splint and adjusting the splint includes changing a distance between at least two portions of the splint that contact respective portions of the heart.

62. The method of claim 59, wherein the real-time monitoring includes imaging the valve.

63. The method of claim 62, wherein the imaging of the valve includes ultrasound imaging.

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